Subject: Heap Leaks on Linux when migrating to new distro and newer UPP Posted by jfranks on Thu, 27 Aug 2015 19:06:09 GMT View Forum Message <> Reply to Message

We have a mature application that has been developed over the years and running on upp-2007.1 and Ubuntu distro 9.10

We've decided to migrate to a new Linux distribution, i.e., Linux Mint 17.2 Also, we migrated to the UPP snap shot upp-x11-src-8760.

We have been successful at compiling and linking the application after making some minor code changes to satisfy the new compile environment and UPP.

Everything works great, except when the application exits. We get a dialog "Fatal error" with the message "Heap leaks detected!" This goes away if we use the project flag USEMALLOC, but this is not the solution since it only hides a memory usage issue.

Ordinarily, development of a new program would have caught this problem early on. The problem is that we are now looking for a needle in the haystack because of the size of the program. Where do we look?

We've tried various memory diagnostic tools to no avail. They give false positives, and provided no useful information. We've tried valgrind and a few others with no relief.

On the other hand, we believe there are memory handling issues in our application that belong to us.

These have only been discovered (or caused by) the new environment: new compiler, linker, libraries, and UPP library.

We've tried compiling the UPP examples and tutorials and they behave properly on exit, as does the UPP theide.

What we are faced with now is dismembering the application piece at a time and re-compile/re-link/re-run until we discover the offending code.

What we are asking is that someone may have a better solution or alternative method for finding the real problem to our heap leak issue. Maybe there is something we can do to obtain more information that we don't know about. We would welcome any help or suggestions on this matter. Please let us know what you think.

regards,

-jlf